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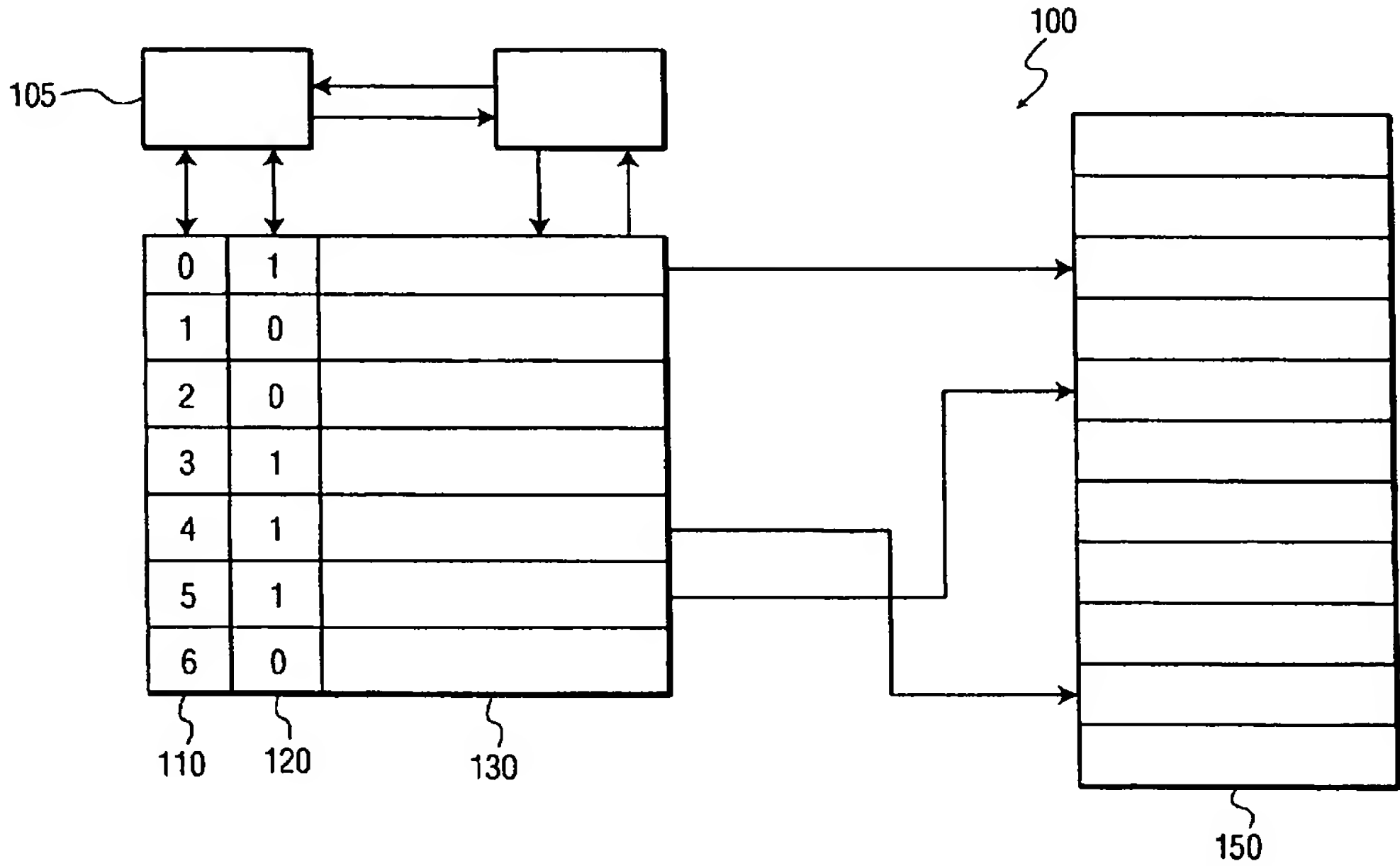
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(54) Title: **HARDWARE REGISTER ACCESS VIA TASK TAG ID**



(57) Abstract: A computer-based software task management system (100) includes an index register (130) configured to store a data register pointer for pointing to a data register (150). A Task ID register (110) is coupled to the index register and configured to store a Task ID keyed to the index register. A Task ID memory (120) is coupled to the Task ID register and configured to store a flag indicating whether the Task ID is available. A state machine (105) is coupled to the Task ID memory and configured to allocate Task IDs on an available basis using a Task ID memory. Advantages of the invention include the ability to efficiently manage a multithreaded operating system with virtually no additional software overhead.

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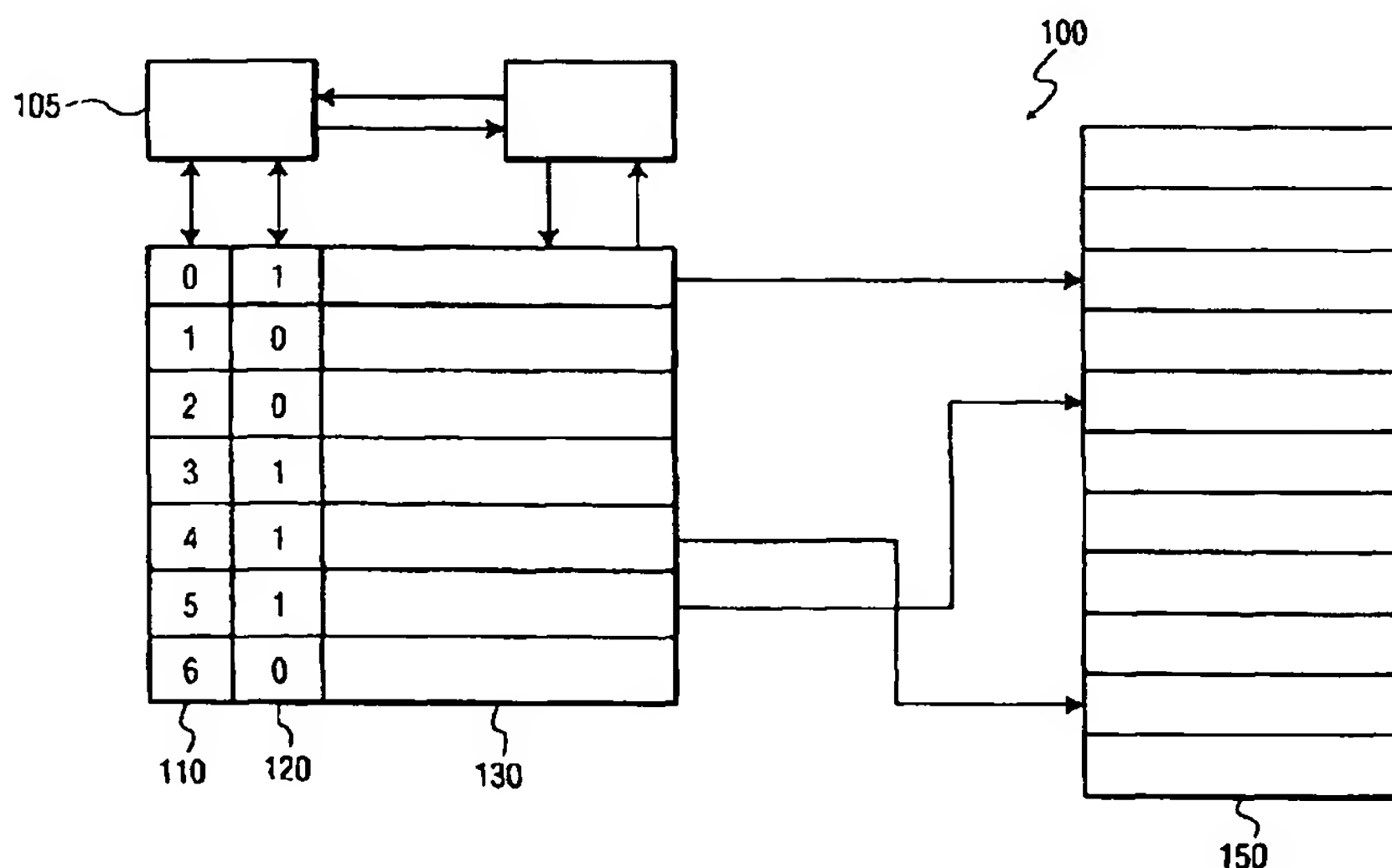
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